

AMENDMENT TO THE CLAIMS

The following listing of claims replaces all prior versions and listings of claims in the application.

Claims 1-2 (Canceled)

3. (Currently Amended) ~~The method of claim 2, wherein said inflammatory bowel disease is Crohn's disease~~ A method of diagnosing or predicting susceptibility to Crohn's disease associated with a 2-2-4 haplotype at the Notch 4, HSP70-HOM and D6S273 loci in an individual, comprising determining the presence or absence in said individual of said 2-2-4 haplotype at the Notch 4, HSP70-HOM and D6S273 loci,
wherein the presence of said 2-2-4 haplotype is diagnostic of or predictive of susceptibility to said Crohn's disease.

Claims 4-5 (Canceled)

6. (Currently Amended) The method of claim 4 3, wherein determining the presence or absence of the 2-2-4 haplotype comprises enzymatic amplification of nucleic acid from said individual.

7. (Original) The method of claim 6, wherein determining the presence or absence of the 2-2-4 haplotype further comprises electrophoretic analysis.

8. (Original) The method of claim 6, wherein determining the presence or absence of the 2-2-4 haplotype further comprises restriction fragment length polymorphism analysis.

9. (Original) The method of claim 6, wherein determining the presence or absence of the 2-2-4 haplotype further comprises sequence analysis.

10. (Currently Amended) The method of claim 4 3, wherein determining the presence or absence of the 2-2-4 haplotype comprises:

- (a) obtaining material comprising nucleic acid including Notch4, HSP70-HOM and D6S273 loci from said individual;
- (b) enzymatically amplifying said nucleic acid to produce a first amplified fragment comprising said Notch4 locus;
- (c) enzymatically amplifying said nucleic acid to produce a second amplified fragment comprising said HSP70-HOM locus; and
- (d) enzymatically amplifying said nucleic acid to produce a third amplified fragment comprising said D6S273 locus.

11. (Original) The method of claim 10, wherein determining the presence or absence of the 2-2-4 haplotype further comprises:

- (e) electrophoresing said first amplified fragment, thereby determining whether a Notch4 allele 2 is present;
- (f) electrophoresing said second amplified fragment, thereby determining whether a HSP70-HOM allele 2 is present; and
- (g) electrophoresing said third amplified fragment, thereby determining whether a D6S273 allele 4 is present,

wherein the presence of said Notch4 allele 2, said HSP70-HOM allele 2 and said D6S273 allele 4 indicates that said 2-2-4 haplotype is present.

12. (Original) The method of claim 10, wherein step (c) further comprises restricting said second amplified fragment with NcoI or an isoschizomer thereof.

Claims 13-20 (Canceled)